

BEST AVAILABLE COPY**II. AMENDMENTS TO THE CLAIMS:**

This listing of claims replaces all prior versions, and listings, of claims of the application.

1. (Currently amended) A method of forming a gas dielectric with support structure comprising the steps of:
 - providing a conductive structure in a wiring-layer dielectric, the conductive structure being separated from the wiring-layer dielectric by a vertical structure;
 - forming a support connected to the conductive structure, the support including an area thereunder; and
 - removing the wiring-layer dielectric and the vertical structure from the area to form a gas dielectric.
2. (Original) The method of claim 1, further comprising the steps of:
 - providing the conductive structure as a first interconnect; and
 - providing a second interconnect in spaced relation away from the first interconnect in the wiring-layer dielectric, wherein the support forms a bridge connecting the first interconnect with the second interconnect.
3. (Original) The method of claim 2, wherein the bridge is formed coplanar with a top surface of the first interconnect and the second interconnect.

4. (Original) The method of claim 2, further comprising the steps of:
 - providing a via-layer dielectric layer;
 - providing the wiring-layer dielectric on the via-layer dielectric; and
 - removing a portion of the via-layer dielectric, wherein the gas dielectric surrounds the bottom of the first interconnect and the second interconnect.
5. (Original) The method of claim 1, wherein the support is formed coplanar with a top surface of the conductive structure.
6. (Original) The method of claim 1, wherein the support includes a dielectric material.
7. (Original) The method of claim 1, further comprising the steps of:
 - providing a via-layer dielectric;
 - providing the wiring-layer dielectric on the via-layer dielectric; and
 - removing a portion of the wiring-layer dielectric, wherein the gas dielectric surrounds a portion of a bottom of the conductive structure.
8. (Currently amended) The method of claim 1, wherein forming the support further comprises the steps of:
 - forming a stopping layer on the wiring-layer dielectric;
 - forming a sacrificial layer on the stopping layer;

selectively removing a portion of the sacrificial layer, the stopping layer, and the wiring-layer dielectric for placement of the conductive structure;

forming the vertical structure as a vertical sacrificial spacer in the portion selectively removed to surround a portion of the conductive structure;

forming the conductive structure between the vertical sacrificial spacer;

partially removing the conductive structure substantially coplanar to a top surface of the sacrificial layer;

removing the sacrificial layer and a top portion of the vertical sacrificial spacer; and

forming a support with the stopping layer and a material on the vertical sacrificial spacer, wherein the material is formed coplanar to a top surface of the stopping layer and connects to the conductive structure.

9-15. (Cancelled).

16. (Currently amended) A method of forming a gas dielectric with support structure comprising the steps of:

providing an underlying structure;

forming a via-layer dielectric on the underlying structure;

forming a wiring-layer dielectric on the via-layer dielectric;

forming a conductive structure in the wiring-layer dielectric, the conductive structure being separated from the wiring-layer dielectric by a vertical structure;

forming a support connected to and coplanar to a top surface of the conductive structure,
the support including an area thereunder; and
removing the wiring-layer dielectric and the vertical structure from the area to form a gas
dielectric.

17. (Original) The method of claim 16, further comprising the steps of:
 - providing the conductive structure as a first interconnect; and
 - providing a second interconnect in spaced relation away from the first interconnect in the
wiring-layer dielectric, wherein the support forms a bridge connecting the first interconnect with
the second interconnect.
18. (Original) The method of claim 16, wherein the conductive structure includes a wire.
19. (Original) The method of claim 16, wherein the support includes a dielectric material.
20. (Original) The method of claim 16, further comprising the step of removing a portion of
the via-layer dielectric, wherein the gas dielectric surrounds a portion of a bottom of the
conductive structure.
21. (New) The method of claim 1, wherein the conductive structure includes a wire.

22. (New) The method of claim 16, further comprising the step of removing a portion of the wiring-layer dielectric, wherein the gas dielectric surrounds a portion of a bottom of the conductive structure.

23. (New) The method of claim 17, wherein the bridge is formed coplanar with a top surface of the first interconnect and the second interconnect.

24. (New) The method of claim 17, further comprising the step of removing a portion of the via-layer dielectric, wherein the gas dielectric surrounds the bottom of the first interconnect and the second interconnect.

25. (New) The method of claim 16, wherein forming the support further comprises the steps of:

forming a stopping layer on the wiring-layer dielectric;
style="padding-left: 40px;">forming a sacrificial layer on the stopping layer; and
style="padding-left: 40px;">selectively removing a portion of the sacrificial layer, the stopping layer, and the wiring-layer dielectric for placement of the conductive structure.

26. (New) The method of claim 25, further comprising the steps of:

forming the vertical structure as a vertical sacrificial spacer in the portion selectively removed to surround a portion of the conductive structure;

forming the conductive structure between the vertical sacrificial spacer;
partially removing the conductive structure substantially coplanar to a top surface of the
sacrificial layer;
removing the sacrificial layer and a top portion of the vertical sacrificial spacer; and
forming a support with the stopping layer and a material on the vertical sacrificial spacer,
wherein the material is formed coplanar to a top surface of the stopping layer and connects to the
conductive structure.

27. (New) A method of forming a gas dielectric with support structure comprising the steps
of:

providing a conductive structure in a wiring-layer dielectric;
forming a support connected to the conductive structure, the support including an area
thereunder; and
removing the wiring-layer dielectric from the area to form a gas dielectric;
wherein forming the support further comprises the steps of:
forming a stopping layer on the wiring-layer dielectric;
forming a sacrificial layer on the stopping layer;
selectively removing a portion of the sacrificial layer, the stopping layer, and the
wiring-layer dielectric for placement of the conductive structure;
forming a vertical sacrificial spacer in the portion selectively removed to surround
a portion of the conductive structure;

forming the conductive structure between the vertical sacrificial spacer;
partially removing the conductive structure;

removing the sacrificial layer and a top portion of the vertical sacrificial spacer;

and

forming a support with the stopping layer and a material on the vertical sacrificial spacer, wherein the material is formed coplanar to a top surface of the stopping layer and connects to the conductive structure.

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